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EXAMINER

ALVESTEFFER, STEPHEN D

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2173

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/807,367

Applicant(s)

PREMCHANDRAN, GIRISH

Examiner

Stephen Alvesteffer

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on 23 October 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-19 and 21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-19 and 21 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

This Office Action is responsive to the After Final Response filed October 23, 2007 wherein attention was drawn to an improperly applied reference under 35 USC 103(c). Therefore, the finality of the Office Action mailed August 21, 2007 has been withdrawn and prosecution re-opened for the instant application.

Claims 1-19 and 21 are presented for examination. Claims 1, 17, and 19 are independent claims.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-13, 15-19, and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Andrew, United States Patent number 6,121,964, and Sowizral et al. (hereinafter Sowizral), United States Patent number 6,983,283.

Regarding claim 1, Andrew teaches a computer implemented method for loading controls, the method comprising: displaying a graphical representation of a first user interface component having a visual appearance of a mechanism for facilitating an input of text (see Andrew Figure 1c item 108; text input controls for inputting data are shown); receiving a first selection input that corresponds to the graphical representation (see Andrew Figure 1b and column 2 lines 54-67; "A user can select one of the possible

values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a"); and loading a first control, the first control being associated with the graphical representation and configured to facilitate an incorporation of text into the graphical representation (see Andrew column 4 lines 28-49; "When the window is first displayed, the window object requests each control object to load the control value from the persistent storage").

However, Andrew does not teach **selectively** loading controls **when they are selected**. Sowizral teaches selectively loading nodes of a hierarchy of information as they are needed by the application (see Sowizral column 6 lines 1-27; "*Given the environmental and rendering attributes of scene graph 50, it may be possible to selectively load portions of scene graph 50 into computer memory based on the position of the viewer or viewers in the virtual world. As the position of the viewer changes in virtual world 52, different portions of scene graph 50 may be loaded into memory and/or purged from memory*"). It would have been obvious to one of ordinary skill in the art at the time the invention was made to load the text input controls of Andrew in a selective manner as performed by Sowizral when the memory of the device is not sufficient to load all the data, in order to allow large amounts of data to be manipulated using a small amount of memory (see Sowizral column 5 lines 44-67; "*Assuming scene graph 50 is too large to fit entirely within the memory of the computer system that is rendering the scene graph, then it may be advantageous to read only selected portions of scene graph 50 into memory*").

Regarding claim 2, Andrew/Sowizral teaches displaying a graphical representation of a second user interface component having a visual appearance of a mechanism for facilitating an input of text (see Andrew Figure 1c item 108; text input controls for inputting data are shown); receiving a second selection input that corresponds to the graphical representation of the second user interface component (see Andrew Figure 1b and column 2 lines 54-67; *"A user can select one of the possible values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a"*, the application is capable of receiving a second selection input); terminating said first control in response to the second selection input (see Sowizral column 6 lines 38-61; *"In FIG. 4, a change in viewpoint 100 is illustrated. As shown in the figure, as viewpoint 100 moves from a position near branch group node 108 to a position near branch group node 110, the leaf nodes of branch group 108 may be purged from memory (i.e., replaced with a pointer), and the leaf nodes of branch group 110 may be read into memory"*, changing the viewpoint is equivalent to selecting a second node. When a second node is selected, the first node is purged from memory and the second node is loaded); and loading a second control in response to the second selection input, the second control being associated with the graphical representation of the second user interface component and configured to facilitate an incorporation of text into the graphical representation of the second user interface component (Andrew Figures 1a-d shows several text entry controls that can each be selected for entry of text).

Regarding claim 3, Andrew/Sowizral teaches that the graphical representations of the first and second user interface components are each separate elements of the same user interface (see Andrew Figures 1a-d).

Regarding claim 4, Andrew/Sowizral teaches receiving a data input that corresponds to said first control (see Andrew Figure 1b and column 2 lines 54-67; *"A user can select one of the possible values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a"*); rendering a representation of the data input as part of the graphical representation of the first user interface component (see Andrew Figure 1a-d).

Regarding claim 5, Andrew/Sowizral teaches that said rendering occurs prior to said terminating (see Andrew Figure 1a-d; the inputted text is rendered prior to the user selecting a different control).

Regarding claim 6, Andrew/Sowizral teaches that said rendering occurs prior to said activating a second control (see Andrew Figure 1a-d; the inputted text is rendered prior to the user selecting a different control).

Regarding claim 7, Andrew/Sowizral teaches that loading a first control comprises loading a textbox control (see Andrew column 4 lines 28-49; *"the control system defines a window class and, for each type (e.g., combobox, text box) of control, a control class"*).

Regarding claim 8, Andrew/Sowizral teaches that loading a first control comprises loading a combobox control (see Andrew column 4 lines 28-49; *"the control*

system defines a window class and, for each type (e.g., combobox, text box) of control, a control class”).

Regarding claim 9, Andrew/Sowizral teaches that providing a graphical representation of a first user interface component comprises providing a graphical representation of a user interface that includes a plurality of user interface components including the first user interface component (see Andrew Figure 1a-d).

Regarding claims 10-13, Andrew/Sowizral teaches that providing a graphical representation of a listbox comprises providing a graphical representation of a listbox that includes said graphical representation of the first user interface component in the form of a list item, a textbox representation, and a combobox representation (see Andrew column 2 lines 54-67; *“FIGS. 1b-1d illustrate the operation of various types of controls. FIG. 1b illustrates the operation of a combobox. The combobox 107 comprises an edit box 107a and a list box 107b. When the user selects the arrow to the right of the edit box 107a, the list box 107b is displayed. The list box contains a list of the possible values that can be entered into the edit box 107a. A user can select one of the possible values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a. FIG. 1c illustrates the operation of an edit box. The user can type in any information into an edit box, subject to editing performed by the underlying computer program”*).

Regarding claim 15, Andrew/Sowizral teaches that receiving a selection input that corresponds to the graphical representation of the first user interface component comprises receiving a selection input at a coordinate location that lines up with the

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graphical representation of the first user interface component (see Andrew Figure 1b and column 2 lines 54-67; *"A user can select one of the possible values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a"*).

Regarding claim 16, Andrew/Sowizral teaches providing a graphical representation comprises providing a computer-readable image format representation (see Andrew Figure 1a-d; the controls displayed on screen are inherently graphical images).

Regarding claim 17, Andrew/Sowizral teaches a computer implemented method for selectively loading controls, the method comprising: providing a graphical representation of a user interface that contains a plurality of graphical representations of individual user interface components, each graphical representation of an individual user interface component being associated with a control (see Andrew Figure 1a-d); receiving a user input (see Andrew Figure 1b and column 2 lines 54-67; *"A user can select one of the possible values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a"*); identifying one of the graphical representations of the plurality of individual user interface components as being associated with the user input (see Andrew Figure 1a-d); loading a first control, the first control being associated with said one of the graphical representations (see Andrew column 4 lines 28-49; *"When the window is first displayed, the window object requests each control object to load the control value from the persistent storage"*); receiving a second user input (see Andrew Figure 1b and

column 2 lines 54-67; *"A user can select one of the possible values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a"*, the application is capable of receiving a second selection input); identifying one of the graphical representations of the plurality of individual user interface components as being associated with the second user input (see Andrew Figure 1b and column 2 lines 54-67; *"A user can select one of the possible values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a"*, the application is capable of receiving a second selection input); terminating the first control in response to the second user input (see Sowizral column 6 lines 38-61; *"In FIG. 4, a change in viewpoint 100 is illustrated. As shown in the figure, as viewpoint 100 moves from a position near branch group node 108 to a position near branch group node 110, the leaf nodes of branch group 108 may be purged from memory (i.e., replaced with a pointer), and the leaf nodes of branch group 110 may be read into memory"*, changing the viewpoint is equivalent to selecting a second node. When a second node is selected, the first node is purged from memory and the second node is loaded); loading a second control in response to the second user input, the second control being associated with said one of the graphical representations associated with the second user input (Andrew Figure 1a-d shows several text entry controls that can each be selected for entry of text).

Regarding claim 18, Andrew/Sowizral teaches that identifying said one of the plurality comprises determining which of the plurality contains a coordinate location

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associated with the user input (see Andrew Figure 1a-d; selecting the coordinate location of the control will allow input at that coordinate location).

Regarding claim 19, Andrew/Sowizral teaches a user interface comprising a plurality of graphical representations of user interface components (see Andrew Figure 1a-d), at least one graphical representation having a visual appearance of a mechanism for facilitating an input of text (see Andrew Figure 1c item 108; text input controls for inputting data are shown), wherein each of said plurality is associated with a control (see Andrew column 4 lines 28-49; *"When the window is first displayed, the window object requests each control object to load the control value from the persistent storage"*), and wherein each control is configured to be loaded exclusively and not concurrently with another control that has not been terminated (see Sowizral column 6 lines 1-27; *"Given the environmental and rendering attributes of scene graph 50, it may be possible to selectively load portions of scene graph 50 into computer memory based on the position of the viewer or viewers in the virtual world. As the position of the viewer changes in virtual world 52, different portions of scene graph 50 may be loaded into memory and/or purged from memory"*), and wherein each control is configured to be loaded in response to a user selection effectuated at a coordinate location within its respective graphical representation (see Andrew Figure 1b and column 2 lines 54-67; *"A user can select one of the possible values from the list box 107b by selecting a value with a mouse and mouse pointer or can use the keyboard to enter a value directly into the edit box 107a"*).

Regarding claim 21, Andrew/Sowizral teaches receiving a data input that corresponds to said first control (see Andrew column 4 lines 28-49; *"When the window is first displayed, the window object requests each control object to load the control value from the persistent storage"*); rendering a representation of the data input as part of the graphical representation identified as being associated with the user input, wherein rendering occurs prior to said terminating the first control (see Andrew Figure 1a-d; the inputted text is rendered prior to the user selecting a different control).

Claim 14 is rejected under 35 U.S.C. 103(a) as being unpatentable over Andrew (6,121,964) *supra*, Sowizral (6,983,283) *supra*, and DuFresne, United States Patent number 5,835,712.

Regarding claim 14, Andrew/Sowizral teach all the limitations of claim 14 except that providing a graphical representation of a user interface comprises providing a graphical representation of an Internet browser interface. DuFresne teaches providing input controls on an Internet browser interface (see DuFresne column 7 lines 53-62; *"Web browsers can receive as well as send information through HTML forms transmitted by Internet servers. HTML forms provide input fields in which a user enters appropriate information through a Web browser. When user inputs are collected on a Web form page, the browser forwards the input values to a Web server specified by the form"*). It would have been an obvious design choice for one of ordinary skill in the art at the time the invention was made to provide the text input controls as taught by Andrew/Sowizral in an Internet browser application as taught by DuFresne for the

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purpose of making Internet browser application forms operate more efficiently in environments with limited memory.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Stephen Alvesteffer whose telephone number is (571) 270-1295. The examiner can normally be reached on Monday-Friday 9:30AM-6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Cabeca can be reached on (571)272-4048. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Stephen Alvesteffer
Examiner
Art Unit 2173

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11-1-2687
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